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Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE _3_ MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.
- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on _09 February 2009_.

2a)☒ This action is **FINAL**.   2b)☐ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) _1-16 and 18-20_ is/are pending in the application.

   4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) _1-16 and 18-20_ is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☐ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

   Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

   Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

   a)☒ All   b)☐ Some * c)☐ None of:

   1.☒ Certified copies of the priority documents have been received.

   2.☐ Certified copies of the priority documents have been received in Application No. _____.

   3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

   * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☐ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☐ Information Disclosure Statement(s) (PTO/SB/08)
   Paper No(s)/Mail Date _____.

4) ☐ Interview Summary (PTO-413)
   Paper No(s)/Mail Date. _____.
5) ☐ Notice of Informal Patent Application
6) ☐ Other: _____.

DETAILED ACTION

Response to Amendment

1.　　Applicant's amendment filed on February 9th, 2009 has been entered. Claim 20

has been added. Claims 1-16 and 18-20 are pending in the application.

Claim Rejections - 35 USC § 103

2.　　The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all

obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set
> forth in section 102 of this title, if the differences between the subject matter sought to be patented and
> the prior art are such that the subject matter as a whole would have been obvious at the time the
> invention was made to a person having ordinary skill in the art to which said subject matter pertains.
> Patentability shall not be negatived by the manner in which the invention was made.

3.　　The factual inquiries set forth in *Graham* **v.** *John Deere Co.*, 383 U.S. 1, 148

USPQ 459 (1966), that are applied for establishing a background for determining

obviousness under 35 U.S.C. 103(a) are summarized as follows:

1.　　Determining the scope and contents of the prior art.
2.　　Ascertaining the differences between the prior art and the claims at issue.
3.　　Resolving the level of ordinary skill in the pertinent art.
4.　　Considering objective evidence present in the application indicating
obviousness or nonobviousness.

4.　　This application currently names joint inventors. In considering patentability of

the claims under 35 U.S.C. 103(a), the examiner presumes that the subject matter of

the various claims was commonly owned at the time any inventions covered therein

were made absent any evidence to the contrary. Applicant is advised of the obligation

under 37 CFR 1.56 to point out the inventor and invention dates of each claim that was

not commonly owned at the time a later invention was made in order for the examiner to

consider the applicability of 35 U.S.C. 103(c) and potential 35 U.S.C. 102(e), (f) or (g)

prior art under 35 U.S.C. 103(a).

5.   Claims 1, 3, 7, 9, 14 and 18 are rejected under 35 U.S.C. 103(a) as being

unpatentable over Aweva et al. (US 6,894,974 B1) in view of Hann (US 7,088,722 B1).

        Aweva et al. disclose a communication system for controlling packet

transmission rate to reduce congestion with the following features: regarding claim 1, a

communication system comprising a transmitter for transmitting one or more data

packets at least one receiver connected to the transmitter for receiving the data packets

and transmitting to the transmitter one or more response signals in response to the

received data packets (Fig. 1, packet network, see "plurality of network elements"

recited in column 4 lines 19-28); a multiplexer for multiplexing and transmitting to the

transmitter the response signals transmitted from the receiver and transmitting the

transmitted data packets from the transmitter to a corresponding receiver (Fig. 2,

network elements, see "multiplexer 50" recited in column 5 lines 53-65); regarding claim

7, a communication system, comprising: at least one transmitter for transmitting one or

more data packets; at least one receiver belonging to a private network and connected

to the transmitter, for receiving the data packets and transmitting to the transmitter one

or more response signals in response to the received data packets (Fig. 1, packet

network, see "plurality of network elements" recited in column 4 lines 19-28) and a

gateway for arbitrating a communication protocol between the transmitter and the

private network (Fig. 2, network elements, see "multiplexer 50" recited in column 5 lines

53-65); regarding claim 20, the one or more data packets transmitted from the

transmitter and the one or more response signals transmitted from the receivers (Fig. 2,

network elements, see "multiplexer 50" recited in column 5 lines 53-65).

Aweva et al. does not disclose the following features: regarding claim 1, the

multiplexer composed of a queue status monitor, a congestion control adjuster, wherein

the queue status monitor monitors a queue status of at least one of the transmitted data

packet and the response signals, wherein the congestion control adjuster instructs the

receiver to hold or compress the response signals based on the monitored queue

status; regarding claim 3, wherein the congestion control adjuster instructs the

corresponding receiver to hold the response signals if the queue status of the monitored

data packets is over a first threshold; regarding claim 7, the gateway composed of a

queue status monitor, a congestion control adjuster, wherein the queue status monitor

monitors a queue status of at least one of the transmitted data packet and the response

signals, wherein the congestion control adjuster instructs the receiver to hold or

compress the response signals based on the monitored queue status; regarding

claim 9, wherein the congestion control adjuster instructs a corresponding receiver to

hold the response signals if the queue status of the monitored data packets is over a

first threshold; regarding claim 14, wherein a congestion control adjuster instructs a

corresponding receiver to hold the response signals if the monitored queue status of the

data packets is over a first threshold regarding claim 18, the congestion control adjuster

instructs the receiver to hold or compress the response signals based on the monitored

queue status received from the queue status monitor; regarding claim 20, further

comprising a fist-in first-out (FIFO) buffer which outputs one of.

Hann discloses a communications system for controlling the flow of multiplexed

data with the following features: regarding claim 1, the multiplexer composed of a queue

status monitor (Fig. 3, a flowchart illustrating a method of controlling the flow of

multiplexed data in the digital subscriber line access multiplexer, see "at step 204 FIFOs

within DSLAM 30 are continuously monitored for status" recited in column 6 lines 50-54

and column 8 lines 25-27), a congestion control adjuster (Fig. 2, a block diagram

illustrating a digital subscriber line access multiplexer 30 of the communication system,

see "flow control unit 148 to receive flow control signal and gives directions" recited in

column 6 lines 54-56), wherein the queue status monitor monitors a queue status of at

least one of the transmitted data packet and the response signals (Fig. 3, a flowchart

illustrating a method of controlling the flow of multiplexed data in the digital subscriber

line access multiplexer, see "at step 204 FIFOs within DSLAM 30 are continuously

monitored for status of data storage capacity" recited in column 8 lines 20-27), wherein

the congestion control adjuster instructs the receiver to hold or compress the response

signals based on the monitored queue status (Fig. 2, a block diagram illustrating a

digital subscriber line access multiplexer 30 of the communication system, see "the flow

control unit 148 directs logic unit 112 to halt transmission of data" recited in column 6

lines 56-60); regarding claim 3, wherein the congestion control adjuster instructs the

corresponding receiver to hold the response signals if the queue status of the monitored

data packets is over a first threshold (Fig. 2, a block diagram illustrating a digital

subscriber line access multiplexer 30 of the communication system, see "the flow

control unit 148 directs logic unit 112 to halt transmission of data" recited in column 6

lines 56-60); regarding claim 7, the gateway composed of a queue status monitor (Fig.

3, a flowchart illustrating a method of controlling the flow of multiplexed data in the

digital subscriber line access multiplexer, see "at step 204 FIFOs within DSLAM 30 are

continuously monitored for status" recited in column 6 lines 50-54 and column 8 lines

25-27), a congestion control adjuster (Fig. 2, a block diagram illustrating a digital

subscriber line access multiplexer 30 of the communication system, see "flow control

unit 148 to receive flow control signal and gives directions" recited in column 6 lines 54-

56), wherein the queue status monitor monitors a queue status of at least one of the

transmitted data packet and the response signals (Fig. 3, a flowchart illustrating a

method of controlling the flow of multiplexed data in the digital subscriber line access

multiplexer, see "at step 204 FIFOs within DSLAM 30 are continuously monitored for

status of data storage capacity" recited in column 8 lines 20-27) and wherein the

congestion control adjuster instructs the receiver to hold or compress the response

signals based on the monitored queue status (Fig. 2, a block diagram illustrating a

digital subscriber line access multiplexer 30 of the communication system, see "the flow

control unit 148 directs logic unit 112 to halt transmission of data" recited in column 6

lines 56-60); regarding claim 9, wherein the congestion control adjuster instructs a

corresponding receiver to hold the response signals if the queue status of the monitored

data packets is over a first threshold (Fig. 2, a block diagram illustrating a digital

subscriber line access multiplexer 30 of the communication system, see "the flow

control unit 148 directs logic unit 112 to halt transmission of data" recited in column 6

lines 56-60); regarding claim 14, wherein a congestion control adjuster instructs a

corresponding receiver to hold the response signals if the monitored queue status of the

data packets is over a first threshold (Fig. 2, a block diagram illustrating a digital

subscriber line access multiplexer 30 of the communication system, see "the flow

control unit 148 directs logic unit 112 to halt transmission of data" recited in column 6

lines 56-60); regarding claim 18, the congestion control adjuster instructs the receiver to

hold or compress the response signals based on the monitored queue status received

from the queue status monitor (Fig. 2, a block diagram illustrating a digital subscriber

line access multiplexer 30 of the communication system, see "the flow control unit 148

directs logic unit 112 to halt transmission of data" recited in column 6 lines 56-60);

regarding claim 20, further comprising a fist-in first-out (FIFO) buffer which outputs one

of (Fig. 2, a block diagram illustrating a digital subscriber line access multiplexer 30 of

the communication system, see "FIFO 134 receives the data, stores it and outputs it"

recited in column 6 lines 14-30).

It would have been obvious to one of ordinary skill in the art at the time of

invention to modify the system of Aweva et al. by using the features, as taught by Hann,

in order to provide the multiplexer composed of a queue status monitor, a congestion

control adjuster, wherein the queue status monitor monitors a queue status of at least

one of the transmitted data packet and the response signals, wherein the congestion

control adjuster instructs the receiver to hold or compress the response signals based

on the monitored queue status, the congestion control adjuster instructs the

corresponding receiver to hold the response signals if the queue status of the monitored

data packets is over a first threshold and a fist-in first-out (FIFO) buffer which outputs.

The motivation is to enhance the functionality of the receiver for avoiding congestion in

a cost effective manner.

6.   Claims 6 and 12 are rejected under 35 U.S.C. 103(a) as being unpatentable over

Aweva et al. (US 6,894,974 B1) in view of Hann (US 7,088,722 B1) as applied to claims

1, 7 and 13 above, and further in view of Norrell et al. (USP 6,853,637 B1).

Aweva et al. and Hann describe the claimed limitations as discussed in

paragraph 5 above. Aweva et al. and Hann do not disclose the following features:

regarding claim 6, wherein the transmitter transmits the data packets at a first

transmission rate exceeding 6 Mbps, and the receiver transmits the response signals at

a second transmission rate under 900 Kbps and regarding claim 12, wherein the

transmitter transmits the data packets at a first transmission rate exceeding 6 Mbps,

and the receiver transmits the response signals at a second transmission rate under

900 Kbps.

Norrell et al. disclose a local shared communication medium with the following

features: regarding claim 6, wherein the transmitter transmits the data packets at a first

transmission rate exceeding 6 Mbps, and the receiver transmits the response signals at

a second transmission rate under 900 Kbps (Fig. 1, communication system, see "ADSL

supports up to 6 Mbps" recited in column 2 lines 15-32 in background of the invention)

and regarding claim 12, wherein the transmitter transmits the data packets at a first

transmission rate exceeding 6 Mbps, and the receiver transmits the response signals at

a second transmission rate under 900 Kbps (Fig. 1, communication system, see "ADSL

supports up to 6 Mbps" recited in column 2 lines 15-32 in background of the invention).

It would have been obvious to one of ordinary skill in the art at the time of

invention to modify the system of Aweva et al. with Hann by using the features, as

taught Norrell et al., in order to provide the transmitter transmits the data packets at a

first transmission rate exceeding 6 Mbps, and the receiver transmits the response

signals at a second transmission rate under 900 Kbps, the transmitter transmits the data

packets at a first transmission rate exceeding 6 Mbps, and the receiver transmits the

response signals at a second transmission rate under 900 Kbps. The motivation of

using these functions is to enhance the system in a cost effective manner.

7.   Claim 19 is rejected under 35 U.S.C. 103(a) as being unpatentable over Aweva

et al. (US 6,894,974 B1) in view of Hann (US 7,088,722 B1) and further in view of

Schweinhart et al. (US 6, 961,539 B2).

Aweva et al. disclose the following features: regarding claim 19, a communication

system, comprising a transmitter for transmitting one or more data packets at least one

receiver connected to the transmitter for receiving the data packets and transmitting to

the transmitter one or more response signals in response to the received data packets

(Fig. 1, packet network, see "plurality of network elements" recited in column 4 lines 19-

28), and a multiplexer for multiplexing and transmitting to the transmitter the response

signals transmitted from the receiver, and transmitting the transmitted data packets from

the transmitter to a corresponding receiver (Fig. 2, network elements, see " multiplexer

50" recited in column 5 lines 53-65);

Hann discloses the following features: regarding claim 19, the multiplexer

composed of a queue status monitor (Fig. 3, a flowchart illustrating a method of

controlling the flow of multiplexed data in the digital subscriber line access multiplexer,

see "at step 204 FIFOs within DSLAM 30 are continuously monitored for status" recited

in column 6 lines 50-54 and column 8 lines 25-27), a congestion control adjuster (Fig. 2,

a block diagram illustrating a digital subscriber line access multiplexer 30 of the

communication system, see "flow control unit 148 to receive flow control signal and

gives directions" recited in column 6 lines 54-56), wherein the queue status monitor

monitors a queue status of at least one of the transmitted data packet and the response

signals (Fig. 3, a flowchart illustrating a method of controlling the flow of multiplexed

data in the digital subscriber line access multiplexer, see "at step 204 FIFOs within

DSLAM 30 are continuously monitored for status of data storage capacity" recited in

column 8 lines 20-27).

Aweva et al. and Hann do not disclose the following features: regarding claim 19,

wherein the congestion control adjuster instructs the receiver to compress the response

signals based on the monitored queue status.

Schweinhart et al. disclose a communication system for scheduling of packet

transmission and queue servicing with the following features: regarding claim 19,

wherein the congestion control adjuster instructs the receiver to compress the response

signals based on the monitored queue status (Fig. 1, a block diagram of a satellite

communications system supporting low latency handling of TCP messages, see "upon

receipt TCP packets applies selectively compression and storing the compressed data

into a queue" recited in column 2 lines 44-54).

It would have been obvious to one of ordinary skill in the art at the time of

invention to modify the system of Aweva et al. with Hann by using the features, as

taught Schweinhart et al., in order to provide the congestion control adjuster instructs

the receiver to compress the response signals based on the monitored queue status.

The motivation of using these functions is to enhance the system in a cost effective

manner.

8.   Claims 2, 4-5, 8, 10-11, 13 and 15-16 are rejected under 35 U.S.C. 103(a) as

being unpatentable over Aweva et al. (US 6,894,974 B1) in view of Hann (US 7,088,722

B1) as applied to claims 1, 7 and 13 above, and further in view of Guttman et al. (USP

7,031,259).

Aweva et al. and Hann describe the claimed limitations as discussed in

paragraph 5 above. Aweva et al. disclose the following features: regarding claim 13, a

communication method in which a receiver receiving data packets from a transmitter

transmits to the transmitter response signals corresponding to the data packets,

comprising (Fig. 1, packet network, see "plurality of network elements" recited in column

4 lines 19-28);

Hann discloses the following features: regarding claim 2, wherein the receiver

includes a response signal holding/compressing unit for, if instructed by the congestion

control adjuster to hold the response signals (Fig. 2, a block diagram illustrating a digital

subscriber line access multiplexer 30 of the communication system, see "the flow

control unit 148 directs logic unit 112 to halt transmission of data" recited in column 6

lines 56-60) and holding the response signals for a first predetermined period of time

(Fig. 2, a block diagram illustrating a digital subscriber line access multiplexer 30 of the

communication system, see "holding the signal for a predetermined limit till it starts

falling below the predetermined storage limit" recited in column 7 lines 55-59); regarding

claim 8, wherein the receiver includes a response signal holding/compressing unit for, if

instructed by the congestion control adjuster to hold the response signals (Fig. 2, a

block diagram illustrating a digital subscriber line access multiplexer 30 of the

communication system, see "the flow control unit 148 directs logic unit 112 to halt

transmission of data" recited in column 6 lines 56-60) and holding the response signals

for a first predetermined period of time (Fig. 2, a block diagram illustrating a digital

subscriber line access multiplexer 30 of the communication system, see "holding the

signal for a predetermined limit till it starts falling below the predetermined storage limit"

recited in column 7 lines 55-59); regarding claim 13, monitoring a queue status of at

least one of the data packets and the response signals (Fig. 3, a flowchart illustrating a

method of controlling the flow of multiplexed data in the digital subscriber line access

multiplexer, see "at step 204 FIFOs within DSLAM 30 are continuously monitored for

status of data storage capacity" recited in column 8 lines 20-27), instructing the receiver

to hold or compress the response signals based on the monitored queue status (Fig. 2,

a block diagram illustrating a digital subscriber line access multiplexer 30 of the

communication system, see "the flow control unit 148 directs logic unit 112 to halt

transmission of data" recited in column 6 lines 56-60) and holding the response signals

for a first predetermined period of time if the holding of the response signals is

instructed (Fig. 2, a block diagram illustrating a digital subscriber line access multiplexer

30 of the communication system, see "holding the signal for a predetermined limit till it

starts falling below the predetermined storage limit" recited in column 7 lines 55-59);

Aweva et al. and Hann do not disclose the following features: regarding claim 2,

if instructed by the congestion control adjuster to compress the response signals,

compressing the response signals for a second predetermined period of time; regarding

claim 4, wherein the congestion control adjuster instructs the corresponding receiver to

compress the response signals if the queue status of the monitored data packets is

under a first threshold and over a second threshold; regarding claim 5, wherein the

congestion control adjuster instructs the corresponding receiver to compress the

response signals and if the queue status of the monitored data packets is under a first

threshold and the queue status of the response signals is over a second threshold;

regarding claim 8, if instructed by the congestion control adjuster to compress the

response signals; regarding claim 10, wherein the congestion control adjuster instructs

a corresponding receiver to compress the response signals if the queue status of the

monitored data packets is under a first threshold and over a second threshold;

regarding claim 11, wherein the congestion control adjuster instructs a corresponding

receiver to compress the response signals if the queue status of the monitored data

packets is under a first threshold and the queue status of the response signals is over a

second threshold; regarding claim 13, compressing the response signals for a second

predetermined period of time if the compression of the response signals is instructed;

regarding claim 15, wherein a congestion control adjuster instructs a corresponding

receiver to compress the response signals if the monitored queue status of the data

packets is under a first threshold and over a second threshold and regarding claim 16,

wherein a congestion control adjuster instructs a corresponding receiver to compress

the response signals if the monitored queue status of the data packets is under a first

threshold and the monitored queue status of the response signals is over a second

threshold.

Guttman et al. discloses a communication system for scheduling of compressible

and non-compressible packets with the following features: regarding claim 2, if

instructed by the congestion control adjuster to compress the response signals (Fig. 4,

scheduling compressible packets, see "step 110" recited in column 11 lines 25-29) and

compressing the response signals for a second predetermined period of time (Fig. 1,

scheduling table, see "determining to compress" recited in column 3 lines 49-56);

regarding claim 4, wherein the congestion control adjuster instructs the corresponding

receiver to compress the response signals (Fig. 1, scheduling table, see "determining a

high bit rate threshold" recited in column 4 lines 37-44) and if the queue status of the

monitored data packets is under a first threshold and over a second threshold (Fig. 1,

scheduling table, see "determines whether to compress the packet" recited in column 4

lines 44-48); regarding claim 5, wherein the congestion control adjuster instructs the

corresponding receiver to compress the response signals (Fig. 1, scheduling table, see

"determining to compress" recited in column 3 lines 49-56) and if the queue status of the

monitored data packets is under a first threshold and the queue status of the response

signals is over a second threshold (Fig. 1, scheduling table, see "high and low

thresholds" recited in column 3 lines 45-50); regarding claim 8, if instructed by the

congestion control adjuster to compress the response signals (Fig. 4, scheduling

compressible packets, see "step 110" recited in column 11 lines 25-29) and

compressing the response signals for a second predetermined period of time (Fig. 1,

scheduling table, see "determining to compress" recited in column 3 lines 49-56);

regarding claim 10, wherein the congestion control adjuster instructs a corresponding

receiver to compress the response signals (Fig. 1, scheduling table, see "determining a

high bit rate threshold" recited in column 4 lines 37-44) and if the queue status of the

monitored data packets is under a first threshold and over a second threshold (Fig. 1,

scheduling table, see "determines whether to compress the packet" recited in column 4

lines 44-48); regarding claim 11, wherein the congestion control adjuster instructs a

corresponding receiver to compress the response signals (Fig. 1, scheduling table, see

"determining to compress" recited in column 3 lines 49-56) and if the queue status of the

monitored data packets is under a first threshold and the queue status of the response

signals is over a second threshold (Fig. 1, scheduling table, see "high and low

thresholds" recited in column 3 lines 45-50); regarding claim 13, compressing the

response signals for a second predetermined period of time if the compression of the

response signals is instructed (Fig. 1, scheduling table, see "determining to compress"

recited in column 3 lines 49-56); regarding claim 15, wherein a congestion control

adjuster instructs a corresponding receiver to compress the response signals (Fig. 1,

scheduling table, see "determining a high bit rate threshold" recited in column 4 lines

37-44) and if the monitored queue status of the data packets is under a first threshold

and over a second threshold (Fig. 1, scheduling table, see "determines whether to

compress the packet" recited in column 4 lines 44-48) and regarding claim 16, wherein

a congestion control adjuster instructs a corresponding receiver to compress the

response signals (Fig. 1, scheduling table, see "determining to compress" recited in

column 3 lines 49-56) and if the monitored queue status of the data packets is under a

first threshold and the monitored queue status of the response signals is over a second

threshold(Fig. 1, scheduling table, see "high and low thresholds" recited in column 3

lines 45-50);

It would have been obvious to one of ordinary skill in the art at the time of

invention to modify the system of Aweva et al. with Hann by using the features, as

taught Guttman et al., in order to provide if instructed by the congestion control adjuster

to compress the response signals, compressing the response signals for a second

predetermined period of time, the congestion control adjuster instructs the

corresponding receiver to compress the response signals if the queue status of the

monitored data packets is under a first threshold and over a second threshold and the

congestion control adjuster instructs the corresponding receiver to compress the

response signals and if the queue status of the monitored data packets is under a first

threshold and the queue status of the response signals is over a second threshold. The

motivation of using these functions is to enhance the system in a cost effective manner.

Response to Arguments

9.   Applicant's arguments with respect to claims 1-16 and 18-20 have been

considered but are moot in view of the new ground(s) of rejection. Applicant states in

the remark regarding claim 1, "there is no teaching or suggestion that a queue status

monitor since the FIFO's monitor themselves". Examiner respectfully disagrees. Han

teaches "FIFO within DSLAM 30 are continuously monitored for status of data storage

capacity as recited in column 6 lines 50-54 and column 8 lines 25-27". Applicant states

"a queue status of at least one of transmitted data packets and the response signal is

monitored". Examiner respectfully disagrees. The FIFOs are monitored for status as

recited in column 8 lines 25-27 of Hann, and of the transmitted or response packets as

recited in column 5 lines 53-65 of Aweva et al. Applicant states "there is non teaching or

suggestion that the multiplexer of Aweva should be modified to include a queue status

monitor or congestion control adjuster". Examiner respectfully disagrees. There is a

teaching to modify the system of Aweva as taught by Hann, in order to provide the

multiplexer composed of a queue status monitor or a congestion control adjuster as

recited in column 6 lines 50-54 and lines 54-56 and column 8 lines 25-27. Applicant

states "there is no teaching or suggestion that receiver is instructed to hold response

signals". Examiner respectfully disagrees. Hann teaches the claimed limitations

"wherein the congestion control adjuster instructs the corresponding receiver to hold the

response signals if the queue status of the monitored data packets is over a first

threshold as recited in column 6 lines 56-60.

Conclusion

10.   **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time

policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE

MONTHS from the mailing date of this action. In the event a first reply is filed within

TWO MONTHS of the mailing date of this final action and the advisory action is not

mailed until after the end of the THREE-MONTH shortened statutory period, then the

shortened statutory period will expire on the date the advisory action is mailed, and any

extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of

the advisory action. In no event, however, will the statutory period for reply expire later

than SIX MONTHS from the mailing date of this final action.

Any inquiry concerning this communication or earlier communications from the

examiner should be directed to SYED BOKHARI whose telephone number is (571)270-

3115. The examiner can normally be reached on Monday through Friday 8:00-17:00

Hrs..

If attempts to reach the examiner by telephone are unsuccessful, the examiner's

supervisor, Kwang B. Yao can be reached on (571) 272-3182. The fax phone number

for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the

Patent Application Information Retrieval (PAIR) system. Status information for

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